

§ 20.1005

10 CFR Ch. I (1–1–99 Edition)

TABLE 1004(B).2—MEAN QUALITY FACTORS, Q, AND FLUENCE PER UNIT DOSE EQUIVALENT FOR MONOENERGETIC NEUTRONS

	Neutron energy (MeV)	Quality factor ^a (Q)	Fluence per unit dose equivalent ^b (neutrons cm ⁻² rem ⁻¹)
(thermal)	2.5×10 ⁻⁸	2	980×10 ⁶
	1×10 ⁻⁷	2	980×10 ⁶
	1×10 ⁻⁶	2	810×10 ⁶
	1×10 ⁻⁵	2	810×10 ⁶
	1×10 ⁻⁴	2	840×10 ⁶
	1×10 ⁻³	2	980×10 ⁶
	1×10 ⁻²	2.5	1010×10 ⁶
	1×10 ⁻¹	7.5	170×10 ⁶
	5×10 ⁻¹	11	39×10 ⁶
	1	11	27×10 ⁶
	2.5	9	29×10 ⁶
	5	8	23×10 ⁶
	7	7	24×10 ⁶
	10	6.5	24×10 ⁶
	14	7.5	17×10 ⁶
	20	8	16×10 ⁶
	40	7	14×10 ⁶
	60	5.5	16×10 ⁶
	1×10 ²	4	20×10 ⁶
	2×10 ²	3.5	19×10 ⁶
	3×10 ²	3.5	16×10 ⁶
	4×10 ²	3.5	14×10 ⁶

^aValue of quality factor (Q) at the point where the dose equivalent is maximum in a 30-cm diameter cylinder tissue-equivalent phantom.

^bMonoenergetic neutrons incident normally on a 30-cm diameter cylinder tissue-equivalent phantom.

§ 20.1005 Units of radioactivity.

For the purposes of this part, activity is expressed in the special unit of curies (Ci) or in the SI unit of becquerels (Bq), or their multiples, or disintegrations (transformations) per unit of time.

(a) One becquerel = 1 disintegration per second (s⁻¹).

(b) One curie = 3.7×10¹⁰ disintegrations per second = 3.7×10¹⁰ becquerels = 2.22×10¹² disintegrations per minute.

[56 FR 23391, May 21, 1991; 56 FR 61352, Dec. 3, 1991]

§ 20.1006 Interpretations.

Except as specifically authorized by the Commission in writing, no interpretation of the meaning of the regulations in this part by an officer or employee of the Commission other than a written interpretation by the General Counsel will be recognized to be binding upon the Commission.

§ 20.1007 Communications.

Unless otherwise specified, communications or reports concerning the regulations in this part should be ad-

ressed to the Executive Director for Operations, U.S. Nuclear Regulatory Commission, Washington, DC 20555. A communication, report, or application may be delivered in person to the Office of the Executive Director for Operations, 11555 Rockville Pike, Rockville, MD 20852.

§ 20.1008 Implementation.

(a) [Reserved]

(b) The applicable section of §§ 20.1001–20.2402 must be used in lieu of requirements in the standards for protection against radiation in effect prior to January 1, 1994¹ that are cited in license conditions or technical specifications, except as specified in paragraphs (c), (d), and (e) of this section. If the requirements of this part are more restrictive than the existing license condition, then the licensee shall comply with this part unless exempted by paragraph (d) of this section.

(c) Any existing license condition or technical specification that is more restrictive than a requirement in §§ 20.1001–20.2402 remains in force until there is a technical specification change, license amendment, or license renewal.

(d) If a license condition or technical specification exempted a licensee from a requirement in the standards for protection against radiation in effect prior to January 1, 1994,¹ it continues to exempt a licensee from the corresponding provision of §§ 20.1001–20.2402.

(e) If a license condition cites provisions in requirements in the standards for protection against radiation in effect prior to January 1, 1994¹ and there are no corresponding provisions in §§ 20.1001–20.2402, then the license condition remains in force until there is a technical specification change, license amendment, or license renewal that modifies or removes this condition.

[59 FR 41643, Aug. 15, 1994]

§ 20.1009 Information collection requirements: OMB approval.

(a) The Nuclear Regulatory Commission has submitted the information collection requirements contained in this part to the Office of Management

¹See §§ 20.1–20.602 codified as of January 1, 1993.